



CITY OF PUYALLUP

Development Services Center

333 S. Meridian, Puyallup, WA 98371

(253) 864-4165 | Fax (253) 840-6678

www.cityofpuyallup.org

SEPTIC SYSTEM LOCATION APPROVAL

12/4/2020

RE: Septic system approval for 433 43RD Ave SW, Puyallup WA 98373

Permit #: P-19-0061

The planning division has approved the location of your septic system as depicted in Attachment A. Due to its location near a wetland buffer, mitigation of any impacts to the wetland will be required if they do occur as a result of constructing this septic system.

Best Regards,

Rachael Brown

Rachael Brown

Assistant Planner

City of Puyallup

Attachments:

A. Wetland Site Map

After Recording
Return to:

Escrow Northwest, Inc.
7030 Tacoma Mall Blvd., Suite 200
Tacoma, WA 98409-6626

SEPTIC EASEMENT

Tax Nos. 04-19-09-1068 and 04-19-09-5003

Van Halder L.L.C., a Washington Limited Liability Company, as the owner of that real property described as follows:

*The East 165 feet of the East half of the Northwest quarter of the Northeast quarter of Section 9, Township 19 North, Range 4 East of the Willamette Meridian;
EXCEPT the South 30 feet;
ALSO EXCEPT that portion thereof conveyed to the City of Puyallup by Deed recorded February 2, 2010 under Auditor's File No. 201002020558;
TOGETHER with the following described property:
Commencing at the Northwest corner of the East 165 feet of the East half of the Northwest quarter of the Northeast quarter of Section 9, Township 19 North, Range 4 East of the Willamette Meridian;
THENCE along the West line of said East 165 feet South 0°03'38" East 40 feet to the true point of beginning;
THENCE continue along said West line South 0°03'38" East 65 feet;
THENCE parallel with the North line of aforesaid subdivision, South 89°43'33" West 15.69 feet to an existing fence;
THENCE along said existing fence, North 1°17'35" East 165.06 feet to the South right of way line of 112th Street East;
THENCE along said South line, North 89°43'33" East 11.79 feet to the true point of beginning.
ALSO TOGETHER with the following described property:
Commencing at the Northwest corner of the East 165 feet of the East half of the Northwest quarter of the Northeast quarter of Section 9, Township 19 North, Range 4 East of the Willamette Meridian;
THENCE along the West line of said East 165 feet of said subdivision, South 0°03'38" East 205 feet to the true point of beginning;
THENCE continue along said West line South 0°03'38" East 1130.52 feet to the South line of aforesaid subdivision;
THENCE along said South line, South 89°56'40" West 45 feet to an existing fence line;
THENCE along said existing fence line, North 1°25'29" East 1130.84 feet to the South line of the North 205 feet of aforesaid subdivision;*

THENCE along said South line, North 89°43'33" East 15.69 feet to the true point of beginning.

ALSO EXCEPT that portion thereof described as follows:

Beginning at the Northwest corner of Lot 1 of Pierce County Short Plat No. 79-558, at a point South 0°03'29" East from the Northeast corner of the Northwest quarter of the Northeast quarter of Section 9, Township 19 North, Range 4 East of the Willamette Meridian 30.00 feet;

THENCE South 89°43'33" West along the Southerly margin of 112th Street East 10.18 feet to an existing fence;

THENCE South 1°34'13" West 343.18 feet to a point on said fence line;

THENCE North 89°43'33" East 19.19 feet to the Southwest quarter of said Lot 1;

THENCE North 0°03'29" West 343.00 feet to the point of beginning.

Situate in the County of Pierce, State of Washington.

(HEREINAFTER: "Burdened Property")

For a valuable consideration hereby bargain, sell and convey to:

David Artz, Trustee of the Fourth Amendment and Restatement of the Artz Revocable Living Trust, as the owner of that real property described as follows:

Lot 3 of Short Plat recorded under Pierce County Recording Number 79-557, records of Pierce County Auditor

Situate in the County of Pierce State of Washington

(Hereinafter: "Benefitted Property"),

a non-exclusive easement for a septic system, including the associated operation and maintenance thereof, over that portion of the above described "burdened property" as fully described on Exhibit "A" hereto and incorporated herein by reference.

A graphical depiction of the Septic Easement Area is attached hereto as Exhibit "B".

A graphical depiction of the Septic System is attached hereto as Exhibit "C".

Together with the right of Grantees to enter upon, over and along said Burdened Property from time to time, after notice reasonable in the circumstances, at times as may be necessary, to inspect, repair, alter, modify, replace, remove, and/or update to present and future technological standards the improvements contained therein.

It is agreed that Grantee, their successors and assigns shall have sole responsibility for the maintenance and repair of said Septic System.

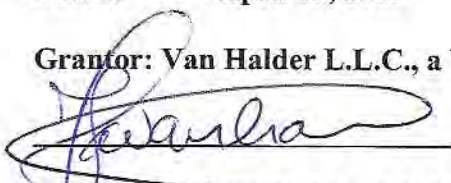
Other than those currently existing, no obstructions of any kind whatsoever (including but not limited to the planting of trees) shall be allowed within the Easement Area that would impede the Grantee's use of the Easement Area for the purposes herein defined.

This easement is a covenant running with the land and shall be binding upon the Grantors, Grantees and their respective successors, heirs and assigns.

In any suit or other proceeding brought by any of the parties to this easement arising out of or pertaining to this easement the substantially prevailing party shall be entitled to recover its reasonable attorney's fees and all costs and expensed from the substantially non-prevailing party, in addition to any other relief.

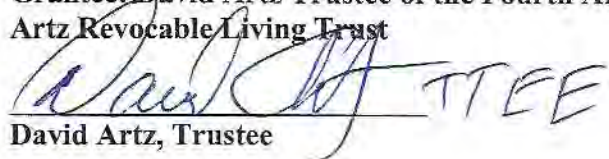
Dated: April 19, 2019

Grantor: Van Halder L.L.C., a Washington Limited Liability Company

A handwritten signature in blue ink, appearing to read 'J. Van Halder', written over a horizontal line.

By Johannes Van Halder, it's Manager

Grantee: David Artz Trustee of the Fourth Amendment and Restatement of the Artz Revocable Living Trust

A handwritten signature in blue ink, appearing to read 'David Artz', written over a horizontal line. To the right of the signature, the word 'TRUSTEE' is written in large, bold, capital letters.

David Artz, Trustee

STATE OF WASHINGTON)

)ss.

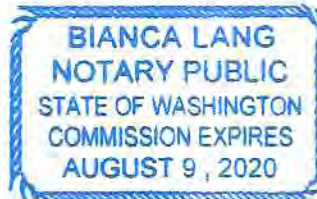
County of Pierce)

I certify that I know or have satisfactory evidence that David Artz is the person who appeared before me, and said person acknowledged that he signed this instrument, on oath stated that he was authorized to execute the instrument and acknowledged it as the Trustee of the Fourth Amendment and Restatement of the Artz Revocable Living Trust to be the free and voluntary act of such party for the uses and purposes mentioned in the instrument.

Given under my hand and official seal this 23 day of April, 2019.

Notary Public in and for the State of
Washington

My appointment expires: 08/09/2020



STATE OF WASHINGTON)

)ss.

County of Pierce)

I certify that I know or have satisfactory evidence that Johannes Van Halder is the person who appeared before me, and said person acknowledged that he signed this instrument, on oath stated that he was authorized to execute the instrument and acknowledged it as the Manager of Van Halder L.L.C. to be the free and voluntary act of such party for the uses and purposes mentioned in the instrument.

Given under my hand and official seal this 23 day of April, 2019.

Notary Public in and for the State of
Washington

My appointment expires: 08/09/2020

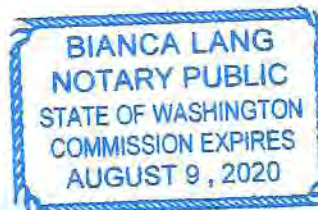


EXHIBIT "A"

The East 165 feet of the East half of the Northwest quarter of the Northeast quarter of Section 9, Township 19 North,

Range 4 East of the Willamette Meridian;

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ALSO EXCEPT that portion thereof conveyed to the City of Puyallup by Deed recorded

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Situate in the County of Pierce, State of Washington.

EXHIBIT 'A'

**LEGAL DESCRIPTION
SEPTIC EASEMENT
(TAX PARCEL NO. 0419091068)**

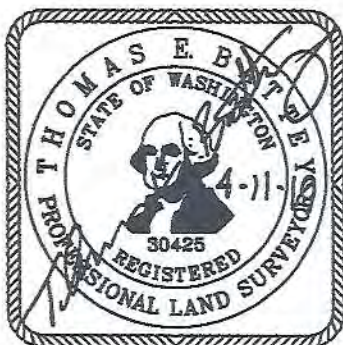
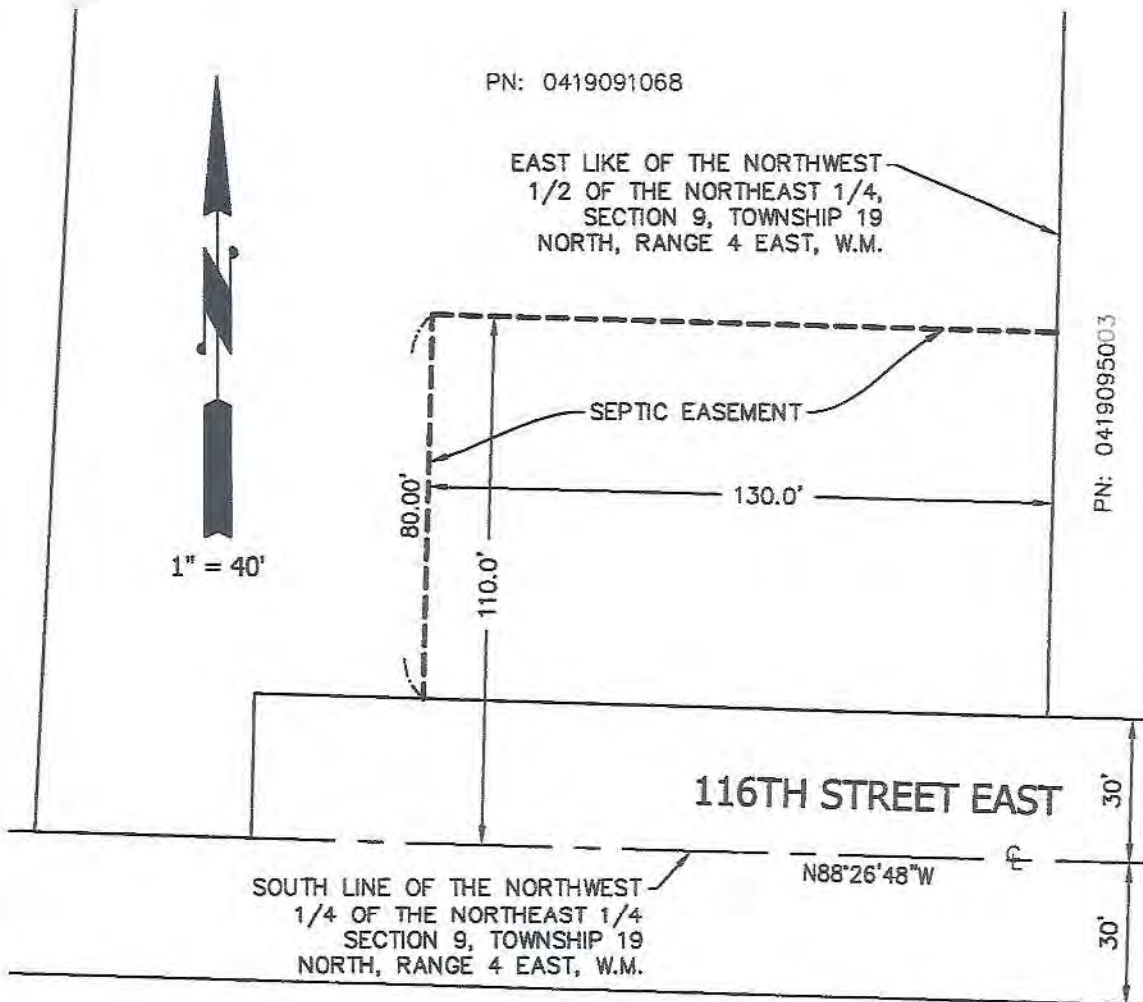
THE EAST 130 FEET OF THE SOUTH 110 FEET OF THE NORTHWEST QUARTER OF
THE NORTHEAST QUARTER OF SECTION 9, TOWNSHIP 19 NORTH, RANGE 4 EAST
OF THE WILLAMETTE MERIDIAN.
SITUATE IN PIERCE COUNTY, WASHINGTON.

EXCEPT THE SOUTH 30 FEET THEREOF.

CONTAINING 10,400 SQUARE FEET, MORE OR LESS.



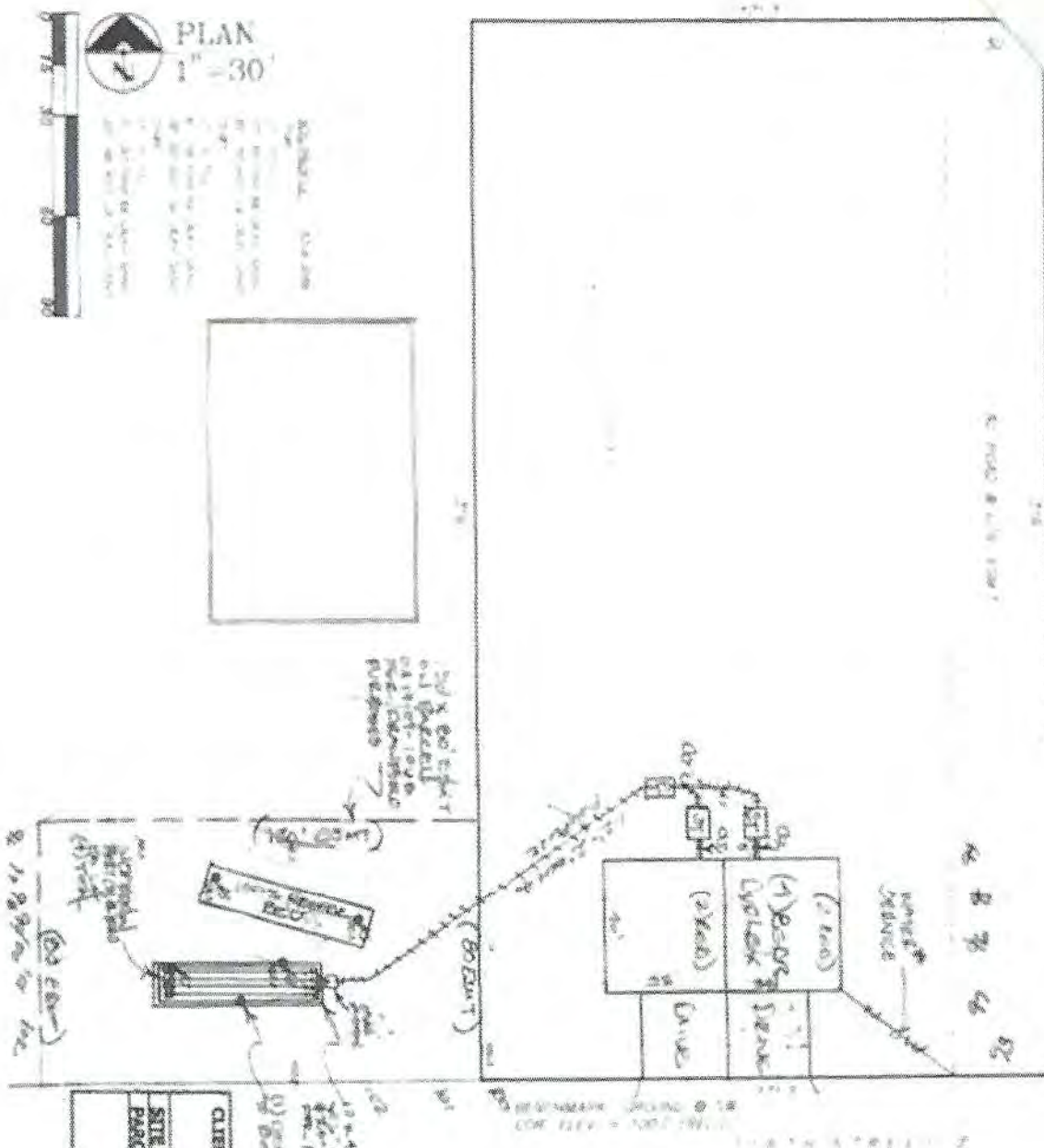
EXHIBIT 'B'
SEPTIC EASEMENT



9198 EXHIBIT
4/11/2019



9027 PACIFIC AVENUE, SUITE 4
TACOMA, WASHINGTON 98444-6247
(253)474-3404 / FAX (253)472-7358



SIN F.	-	14.5
STR OUT	-	42.0
SEPTICIN	-	51.75
OUT	-	41.5
INNOV. 710		
LOST 100 101.0		

Table 1. Mean values of the variables measured in the 1000 subjects.

1. The first step in the process is to identify the problem or issue that needs to be addressed. This involves gathering information and understanding the context of the problem.

[illegible][illegible]

“人自強，天亦助之”，所以，你如欲成功，必須先求己之進步。進步之道，在於不斷學習，不斷充實自己，不斷提高自己。只有不斷學習，不斷充實自己，不斷提高自己，才能在競爭激烈的社會中立於不敗之地。

——《論人自強》

[illegible][illegible][illegible]

SITE EXHIBIT

SCALE: 1" = 30'

- 1) THE MONUMENT CONTROL SHOWN FOR THIS SITE WAS ACCORDING TO THE 1925 SURVEY. THERE WAS NO RECORD OF A SECOND MONUMENT BEING SET AT THE TIME OF THE 1925 SURVEY. THE MONUMENT WAS BEING USED BY THE BUREAU OF LAND MANAGEMENT FOR THE PURPOSES OF BOUNDARY DETERMINATION AND REAL ESTATE TRANSACTION. THE CLOSING OF THE TRANSFERS MET THE STANDARDS OF MAC BASE 125-130-00.
- 2) BASE 125-130-00 FIELD MEASUREMENT.
- 3) THIS SURVEY REPRESENTS PHYSICAL INDEPENDENT CONDITIONS AS SURVEYED. THE DATE OF THE FIELD SURVEY WAS 1925. THE SURVEY WAS CONDUCTED ON-SITE AND THE TOPOGRAPHY WAS CHANGING.
- 4) THIS SURVEY WAS MADE WITHOUT THE BENEFIT OF A TITLE RECORD. THE SURVEY WAS MADE IN ORDER TO DETERMINE THE BOUNDARY OF THE LAND WHICH WAS BEING USED FOR THE PURPOSES OF BOUNDARY DETERMINATION.
- 5) IT IS NOT THE INTENT OF THIS SURVEY TO MAKE ENDORSEMENTS OR RESERVATIONS WHICH MAY AFFECT THIS SITE.
- 6) THE PURPOSE OF THIS SURVEY IS TO PROVIDE EXISTING CONDITIONS FOR ENGINEERING DESIGN.
- 7) MEASUREMENTS WERE OBTAINED FROM THE DIRECT FIELD MEASUREMENTS. THERE ARE NO DIRECT LIMITATIONS OF PER MAC 322-130-145 3G.
- 8) THERE ARE NO DIRECT LIMITATIONS OF PER MAC 322-130-145 3G.
- 9) BOUNDARY INFORMATION SHOWN HEREIN IS FROM A PRIOR SURVEY. THE SURVEY WAS MADE IN ORDER TO DETERMINE THE BOUNDARY OF THE LAND WHICH WAS BEING USED FOR THE PURPOSES OF BOUNDARY DETERMINATION.
- 10) THE SURVEY WAS MADE IN ORDER TO DETERMINE THE BOUNDARY OF THE LAND WHICH WAS BEING USED FOR THE PURPOSES OF BOUNDARY DETERMINATION.
- 11) THE SURVEY WAS MADE IN ORDER TO DETERMINE THE BOUNDARY OF THE LAND WHICH WAS BEING USED FOR THE PURPOSES OF BOUNDARY DETERMINATION.
- 12) THE INTENT OF THIS SURVEY WAS TO LOCATE VISIBLY UTILITIES. THE SURVEY WAS MADE IN ORDER TO DETERMINE THE BOUNDARY OF THE LAND WHICH WAS BEING USED FOR THE PURPOSES OF BOUNDARY DETERMINATION.

NORTH AMERICAN VERTICAL DATUM OF 1989 (NAVD 89)

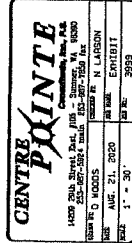
BASE:
PIERCE COUNTY BENCHMARK NO. 21 037 (SPSN-0137) (NDS DL2772)
FOUND NGS. THE MARK IS AN N.G.S. CLASS A MARK (STAINLESS
STEEL ROD IN AN ALUMINUM CASE WITH LID.
ELEVATION: 448.08 FEET.

[illegible]TAX PARCEL
0419095002

TAX PARCEL
0419095004

116TH STREET EAST

LEGEND:
WF - WETLAND FLAG



NE-NE 9, T19N., R4E., W.M.

DAVID ARIZ
7917 11015 STREET NORTHWEST
GIG HARSHUR, WA 98330

PIERCE COUNTY, WASHINGTON

SHEET 1 OF 1

January 29, 2020

DAVID ARTZ
4807 51ST STCT E
TACOMA, WA 98443
253 307-1002

Artz Site and Soil Evaluation

Parcel No.	0419095003, 5004 & 5022
Site Address	409, 427 and 433 43rd AV SW
Site Observations	January 20, 2020

Introduction

It is the intent of this letter to present site and soil characteristics with regard to potential critical areas which may exist on the above-mentioned property. Site conditions and evaluation are required to support on-site septic designs prepared for two of the three parcels. Site observations, subsurface soil observations and research conducted for the three lots and specifically the two southern parcels found no critical areas as defined by the City of Puyallup ordinance. The soil and site conditions are considered consistent with the development proposed.

Project Description

A landslide hazard report is necessary to satisfy the City of Puyallup's Municipal Code requirements relating to building activities in the area of qualifying slopes. Specifically, the applicant intends to complete a remodel and deck addition on an existing single-family home which is located near slopes meeting the criteria for report submission. We understand that these improvements are planned on the nearly level portion of the site, although all slopes will be evaluated relative to the City's ordinance.

Per Puyallup Municipal Code 21.06.1210(3)(ii); a geotechnical report is required if all three of the following characteristics are met:

- A. Slopes steeper than 15%
- B. Hillsides intersecting geologic contacts with a relatively permeable sediment overlying a relatively impermeable sediment or bedrock; and
- C. Springs or groundwater seepage

As part of this assessment we made observations of adjacent slopes for the presence of landslide hazard indicators. We also reviewed available published soil and geological records, aerial photography, topographical maps, and LiDAR terrain maps to help gain an understanding of the area morphology and establish an opinion on slope morphology and stability.

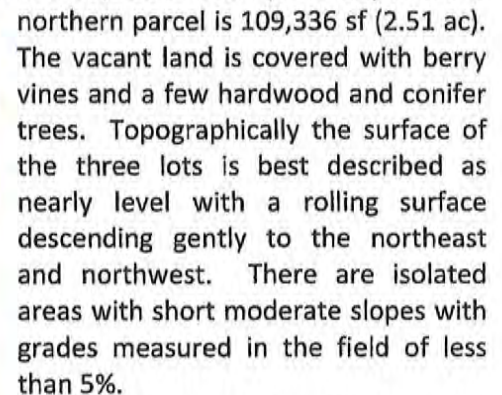
Information Sources

The regulatory standard for this assessment is outlined in the City of Puyallup Municipal Code, Chapter 21.06.1210-70. Soil identification and mapping for this assessment is supported by information from the Natural Resource Conservation Service (the Survey), and on-site soil evaluation performed during the wastewater system design phase as documented in the Tacoma-Pierce County Health Department records. Geologic information for this assessment is supported by information from the United States Geological Survey (USGS) Draft Geologic Map Geologic Map of the Puyallup 7.5 Minute Quadrangle. Our understanding of slope morphology is supported by the review of published topographic and relief map layers from the Pierce County Geographical Information System (GIS). Our slope stability opinions

Published Information Accuracy

Site Description

The project involves of three parcels located north of 43rd AV SW (116th ST E) between 4th ST PL SW and 98th AV E on South Hill, Puyallup. The two southern lots are currently being developed; the northern lot will not be developed at this time. The two southern parcels are 54,450 sf each (1.25 ac.) and the



Soil

portion of the wastewater permitting phase confirmed soil typical of Everett gravelly sandy loamy.

Everett 13B – Everett gravelly sandy loam, 0 – 6 percent slopes

This rolling soil is somewhat excessively drained. It formed in gravelly glacial outwash under conifers. The typical elevation range for this soil is from 200 to 700 feet. Included with this soil in mapping are about eight percent Alderwood soils. Also included are some areas that are as much as five percent sandy Indianola soils and ten percent gravelly Neilton soils and less sloping Everett soils. In a typical profile the surface layer is very dark brown gravelly sandy loam about two inches thick. The subsoil, between depths of two and 19 inches, is dark yellowish brown gravelly sandy loam and dark brown very gravelly coarse sandy loam. The substratum, between depths of 19 and more than 60 inches, is clean, loose very gravelly sand.

Permeability is rapid. The available water capacity is low. Surface runoff is slow, and the erosion hazard is low. The effective rooting depth is more than four feet.

This nearly level to undulating soil is somewhat excessively drained. It formed in gravelly glacial outwash under conifers. Elevation ranges from 200 to 700 feet. The annual precipitation is 35 to 45 inches, and the mean annual air temperature is about 50 degrees F. The frost-free season is about 180 days. Most areas of this soil are gently sloping, but some places are broken by steep slopes 15 to 70 feet long.

Included with this soil in mapping are ten percent Neilton gravelly loamy sand and less than 10 percent Alderwood and sandy Indianola soils.

In a typical profile the surface layer is very dark brown gravelly sandy loam about two inches thick. The subsoil, between depths of two and 19 inches, is dark yellowish brown gravelly sandy loam and dark brown very gravelly coarse sandy loam. The substratum, between depths of 10 and more than 60 inches, is clean loose very gravelly sand. Reaction is medium acid.

Permeability is rapid. The available water capacity is low. Surface runoff is slow, and there is little or no erosion hazard. The effective rooting depth is more than four feet.

Large areas of this soil are under native vegetation, but they are being rapidly urbanized. This soil is among the least desirable in the area for farming, but it is one of the most desirable for and home sites and as a source of gravel for construction purposes. There are no limitations for urban development. However, septic waste from drain fields endanger ground water supplies because the soil is rapidly permeable.

NRCS Soil Map

Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
13B	Everett very gravelly sandy loam, 0 to 6 percent slopes	49.2	67.6%
13C	Everett very gravelly sandy loam, 6 to 15 percent slopes	16.3	22.3%
25A	Neilton fine sandy loam	0.7	0.9%
IV	Water	0.8	0.9%



Geology

According to the USGS *Draft* Geologic Map of the Puyallup 7.5 Minute Quadrangle in Figure 2 below: this plateau region was formed by the gradual emplacement glacial drift stratigraphy; followed by the erosion of the previously emplaced glacial drift deposits by channelized glacial meltwater incision along the west side, and by ice lobe truncation within the Puyallup valley. The map shows that the slope section dipping to the northeast provides a depositional record of the pre-vashon mixed fine and coarse deposits, overlain by the Vashon advance outwash, overlain by the Vashon till, and finally overlain by the Vashon recessional outwash. The slope face represents the location where the much larger glacier within the valley truncated the slope face thus exposing a stratigraphic record of deposits. Figure 2 illustrates the site's position relative to the geology.

Hydrology

The NRCS along with soil logs prepared from the Tacoma-Pierce County Health Department (TPCHD) on-site septic system design documented the soil profiles as medium sand with gravel (ie: Everett 13B). These well drained soils existing on a rolling plain would suggest any precipitation entering the area can readily evacuate given the slope and high soil permeability. Isolated areas of surface perched water were observed across the northwest corner of the western lot. We do not see the conditions existing where large scale ground water buildup (and thus de-stabilizing pore pressure) can occur.

USGS Geologic Map of the Puyallup 7.5 Minute Quadrangle (Excerpt)



Troost, K.G. (In Review)

Qvs	Steilacoom Gravel of Walters and Kimmel (1968)—Sandy gravel and cobbles; clean to silty; poorly to well sorted; horizontally to cross bedded; loose to dense. Deposits vary from veneer of ~1 to 15 m (3 to ~50 ft) thick. Deposited by multiple outburst floods from subsequently lower elevations of Glacial Lake Puyallup. Locally subdivided first by channel affiliation (Clover Creek or Bradley) and secondarily by relative age in descending series of deposits; higher number denotes younger (lower) deposit. Clover Creek channel (Bretz, 1913) begins in section 8, T19N, R4E. Bradley channel; herein named for Lake Bradley in section 3, T19N, R4E; begins in section 2, T19N, R4E. Numbering system contiguous w/adjacent Tacoma South quadrangle where multiple Clover Creek deposits are mapped (Troost, 2006). Mapable deposits consist of:
Qvs ccl	Clover Creek deposit at elevation ~380 ft
Qvs b4	Bradley deposit at elevation ~400 ft
Qvs b3	Bradley deposit at elevation 420 – 440 ft
Qvs b2	Bradley deposit at elevation 440 – 460 ft
Qvs b1	Bradley deposit at elevation 460 – 480 ft

Critical Area Review

On January 24th, 2020, site observations were made for the presence of indicators associated with landforms susceptible or undergoing mass movement due to a combination of geologic, seismic, topographic, hydrologic, or man-made factors. Per the **City of Puyallup Chapter 21.06 – “Critical Areas” (and specifically Section 21.06.1210);**

Geologically hazardous areas shall be classified as follows:

(a) Landslide and erosion hazard areas are areas of potential slope instability. Erosion hazard areas include those identified by the U.S. Department of Agriculture Natural Resources Conservation Service as having a moderate to severe, severe, or very severe erosion hazard

rainfall patterns, or human-induced changes to natural characteristics. Landslide and erosion hazard areas include areas with the following characteristics:

- (i) Areas that have shown mass movement during the Holocene epoch (from 10,000 years ago to the present) or that are underlain or covered by mass wastage debris of that epoch;*
- (ii) Slopes that are parallel or subparallel to planes of weakness (such as bedding planes, joint systems, and fault planes) in subsurface materials;*
- (iii) Slopes having gradients steeper than 80 percent subject to rock fall during seismic shaking;*
- (iv) Areas potentially unstable because of stream incision or stream bank erosion;*
- (v) Areas located in a canyon, ravine, or on an active alluvial fan, presently or potentially subject to inundation by debris flows or flooding;*
- (vi) Any area with a slope of 40 percent or steeper and a vertical relief of 10 or more feet, except areas composed of consolidated rock and properly engineered manmade slopes/retained fill. A slope is delineated by establishing its toe and top and measured by averaging the inclination over at least 10 feet of vertical relief;*
- (vii) Areas with a severe limitation for building development because of slope conditions, according to the Natural Resource Conservations Service; and*
- (viii) Areas meeting all three of the following criteria: (A) slopes steeper than 15 percent, except that slopes of less than 15 percent may be considered erosion hazard areas if they have certain unstable soil and drainage characteristics; (B) hillsides intersecting geologic contacts with a relatively permeable sediment overlying a relatively impermeable sediment or bedrock; and (C) wet season springs or ground water seepage.*

Findings and Conclusions

In addition to the list of indicators above (i through viii), we reviewed published geologic maps, topographic maps, shaded relief maps, and aerial photography to form an opinion on slope morphology. We did not observe any of the potential landslide hazard indicators from the list above, nor does the landform show the classic, morphologic signatures associated with mass movement. This would be expected given that the angle of repose (the maximum angle at which a material is stable) has not been exceeded per our measurements.

Based on our observations and review of the published geology, soils, and topography, it is our opinion areas proposed for application of the on-site septic systems are stable landforms resulting from the depositional mechanisms contemporary with glacial meltwater. In our opinion, the slopes appear to be

designed in accordance with state and local design criteria based on the soil textures and application rate for the soil characteristics. The proposed drainfield areas are consistent with the design criteria and will not create an unstable condition.

Closure

The conclusions and recommendations presented in this letter are based, in part, on our interpretations and assumptions regarding subsurface conditions; therefore, if variations in the site conditions are observed at a later time, we may need to modify this letter to reflect those changes. We appreciate the opportunity to be of service on this project. If you have any questions regarding this letter or any aspects of the project, please feel free to contact our office.

Respectfully submitted,

Innovative GEO-Services, LLC



1/30/2020

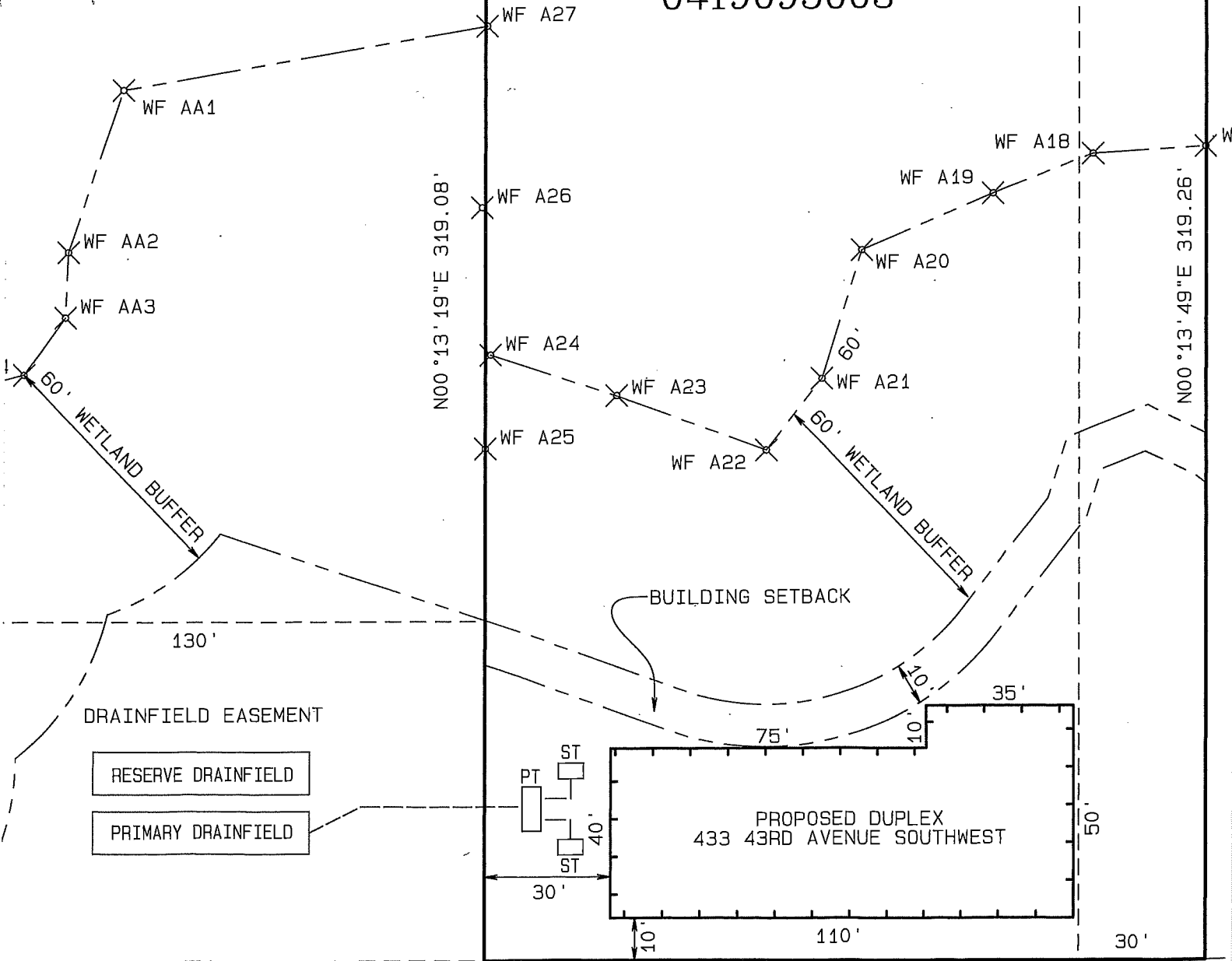
REX B. HUMPHREY

Rex Humphrey, L.E.G.
Engineering Geologist

30'

30' ROAD EASEMENT

TAX PARCEL 0419095003



433 43rd Ave S.W.

30' 43rd Ave SW 30' ROAD & UTIL. ESM'T.

SCAN

2/27/19 KF
 ⑤ 0-18" V15L
 18-64" type 1
 ⑥ 0-20" V15L
 20-60" type 1
 ⑦ 0-10" V15L
 10-50" type 1
 ⑧ 0-20" V15L
 20-50" type 1

319'

319'



SOIL PROFILE: 12-6-2018
 TH#6
 0' - 17' FILL
 17' - 35' FINE BR. GRAV. SAND
 35' - 75' MED. CR. GRAV. SAND
 TH#7
 0' - 6' FILL
 6' - 18' FINE BR. GRAV. SAND
 18' - 45' MED. CR. GRAV. SAND
 TH#8
 0' - 5' FILL
 5' - 20' FINE BR. GRAV. SAND
 20' - 68' MED. CR. GRAV. SAND



RECEIVED
 JAN 24 2019
 Oregon Health Department

100' x 80' ESM'T
 ON PARCEL
 04-19-01-10-0-3
 FOR DRAINFIELD
 PROPOSED



BENCHMARK: GROUND @ SW
 COR. ELEV. = 100.0 (REL.)

116TH STREET E.

INVERT ELEVATIONS

FIN. FL. = 94.5
 STUB OUT = 92.0
 SEPTIC IN = 91.75
 OUT = 91.5
 PUMP J = 91.0
 LAT. I.E. = 101.0

ALL TANKS MUST HAVE RISERS TO FINISH GRADE

NOTE: FOOTING DRAINS INSTALLED MUST BE USED IN CONJUNCTION WITH INFILTRATION TRENCHES AND MUST MAINTAIN A 10FT. (MIN) SETBACK FROM ALL DRAINFIELD COMPONENTS. NOTE: ROOF TOP DRAINS INSTALLED MUST EITHER DRAIN INTO THE STREET OR MUST BE USED IN CONJUNCTION WITH AN INFILTRATION TRENCH, MAINTAINING 10FT. (MIN) SETBACKS FROM ALL DRAINFIELD COMPONENTS.

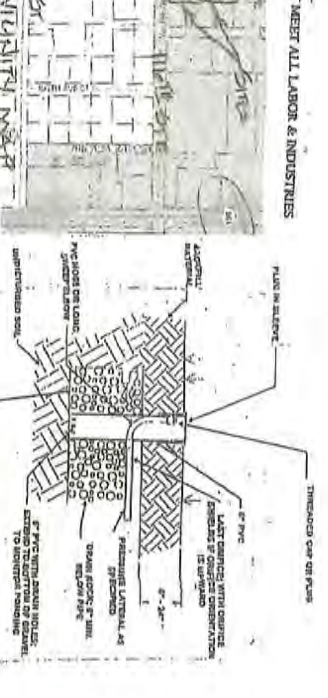
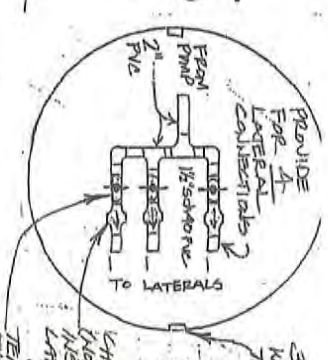
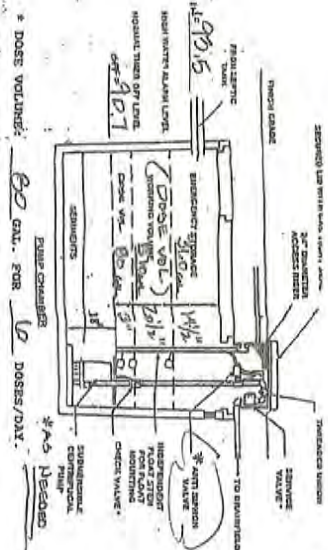
NOTE TO HOMEOWNER, BUILDER, OR DEVELOPER: *CLAYING IN THE DRAINFIELD AREA TO BE DONE UNDER THE SUPERVISION OF THE INSTALLER. *MINIMUM HOME SETBACKS TO BE VERIFIED BY THE BUILDING DEPARTMENT. WE ASSUME NO LIABILITY IF GREATER SETBACKS ARE REQUIRED.

THIS DESIGN IS NOT A SURVEY: ALL PROPERTY LINES AND DIMENSIONS, AS SHOWN ARE FROM INFORMATION SUPPLIED BY THE CLIENT OR COUNTY OFFICE. WE ASSUME NO LIABILITY FOR VARIATIONS ASCERTAINED BY ACTUAL OR MORE RECENT SURVEYS.

*WATER SERVICE: KEEP 10' (MIN) FROM ALL DRAINFIELD TRENCHES AND SEPTIC TANKS AND PIPS OR ENDS WITH SCH 40 PIPE. ALSO PROVIDE CRUSH PROOF SLEEVE UNDER DRIVING SURFACES.

PROVIDE TEST CHIMNEYS @ END OF EACH LATERAL FACING UP (ALL CHIMNEYS TO BE FACING UP). SYSTEM TO BE TESTED PRIOR TO FINAL SIGN-OFF OF THE INSTALLATION.

CLIENT: DANIEL PEREZ (253) 307-1022
 4007 51st St. E.
 Tacoma, WA 98443
 PHONE: 206-425-4245
 SITE ADDRESS: 40102 5th Ave SW DATE: 1-11-19
 PARCEL NO.: 04-19-09-5-003 (REV. DATE: —)
 PENINSULA SEPTIC DESIGNS
 SANDRA R. SMITH
 P.O. BOX 1444, GIG HARBOR WA 98335 PH#(253) 851-2178



DO NOT INSTALL TANKS IN RESERVE AREA.
TANK(S) MUST BE WATERPROOF TO A LEVEL ABOVE ANY POSSIBLE SEASONAL GROUND WATER. (LEAK TEST MAY BE REQUIRED.)

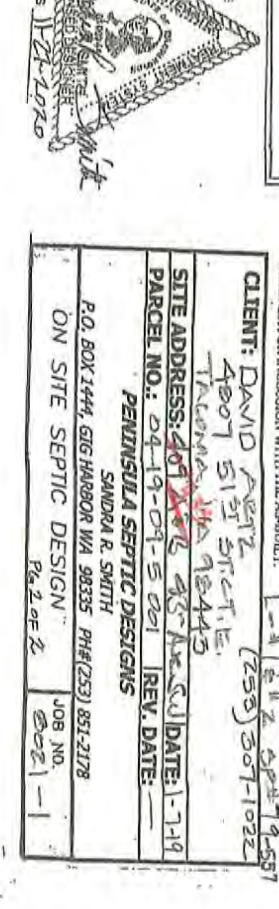
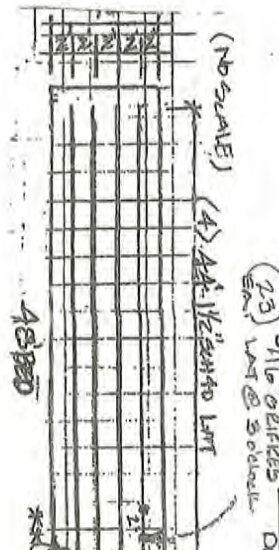
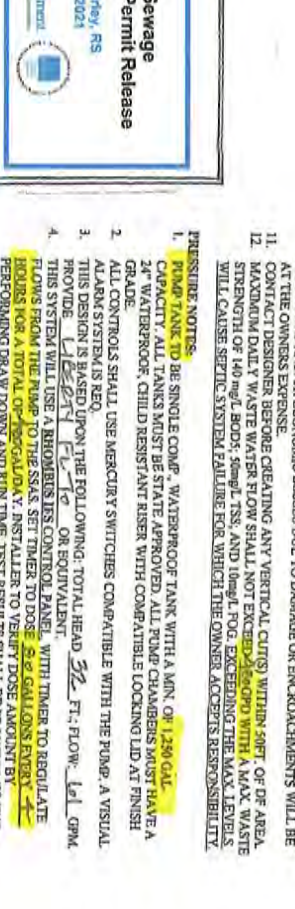
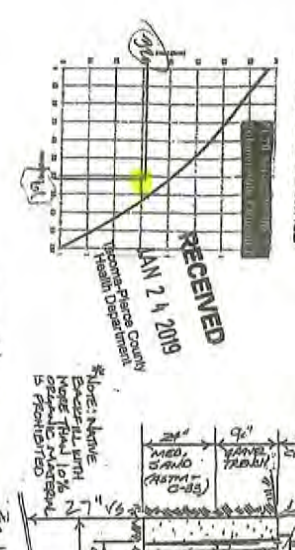
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TIMED DOSING
TANK SPECIFICATIONS: INTENT TO PROVIDE 50 GAL./DOSE @ 4HR INTERVALS.
TANK MUST BE ADJUSTED TO PROVIDE A 50 GAL. DOSE BASED ON ACTUAL DRAIN DOWN TEST (See example below).
EXAMPLE DRAIN DOWN: 3 PER. MIN. = 50.8 GPM (Based @ 19.4 gal./stroke) 120 GAL. DOSE / 58.2 GPM = 2.06 MIN. TIME SETTING.

USE RHOMBUS JFS PANEL

USE RHOMBUS JFS PANEL



NOTES:

1. ASPECT AND LOCATION OF UNDERGROUND UTILITIES BEFORE DIGGING.
2. THIS DESIGN IS BASED UPON 2" REDUCED SF HOME, DAILY USAGE: 120 GAL./DAY. PROVIDE (01) 120 GAL. (01) 2 COMPARTMENT SEPTIC TANKS WITH RISERS TO FINISH GRADE. (ALL TANKS MUST HAVE RISERS TO GRADE).
3. INSTALL A EFFLUENT FILTER IN THE SEPTIC TANK OUTLET ACCESS FOR (2) INSTALL 1" (1/2" MIN) 1/2" SCH 40 LAT. IN 10' X 4' DRAINFIELD BED. DRAINFIELD BED TO BE LEVEL FOLLOWING CONTOURS.
4. ALL SURFACE WATER RUNOFF FROM DRIVEWAYS AND ROOF DRAINS SHALL BE DIRECTED NOT TO FROM DRAINFIELD.
5. NOT TO BE ASSIGNED FOR A GARBAGE DISPOSAL.
6. CONSTRUCTION AND MATERIALS SHALL CONFORM TO THE LATEST REGULATIONS AND BE OF THE LOCAL COUNTY HEALTH DEPT. AND WSOH. THIS SYSTEM REQUIRES CERTIFICATION OF THE DESIGNER AND INSTALLATION DOES NOT INSURE CONTINUOUS TROUBLE-FREE SERVICE.
7. NO EXCAVATION OR ALTERATION AFFECTING THE DRAINFIELD SITE IS PERMITTED. ENCROACHMENTS INTO THE DRAINFIELD AREA MAY RENDER THE SITE UNSAFE. RE-DESIGN AND/OR ECONOMIC LOSSES DUE TO DAMAGE OR ENCROACHMENTS WILL BE AT THE OWNERS EXPENSE.
8. CONTRACT DESIGNER BEFORE CREATING ANY VERTICAL CUTS) WITHIN 50FT. OF AREA. MAXIMUM DAILY WASTE WATER FLOW SHALL NOT EXCEED 120 GPD WITH A MAX. WASTE STRENGTH OF 140 mgd. BOD5, 5% TSS, AND 1000 TPD. EXCEEDING THE MAX. LEVELS WILL CAUSE SEPTIC SYSTEM FAILURE FOR WHICH THE OWNER ACCEPTS RESPONSIBILITY.

PRESSURE NOTES:

1. ROAD TANK TO BE SINGLE COMP. WATERPROOF TANK WITH A MIN. OF 120 GAL. CAPACITY. ALL TANKS MUST BE STATE APPROVED. ALL TANK CHANGERS MUST HAVE A 2" WATERPROOF, CHILD RESISTANT RISER WITH COMPATIBLE LOCKING LID AT FINISH GRADE.
2. ALL CONTROLS SHALL USE MERCURY SWITCHES COMPATIBLE WITH THE PUMP. A VISUAL ALARM SYSTEM IS REQ.
3. THIS DESIGN IS BASED UPON THE FOLLOWING: TOTAL HEAD 32 FT.; FLOW: 141 GPM. PROVIDE 1/2" P.V.C. OR EQUIVALENT.
4. THIS SYSTEM WILL USE A RHOMBUS JFS CONTROL PANEL, WITH TIMER TO REGULATE FLOWS FROM THE PUMP TO THE SINKS SET TIMER TO DOSE 50 GAL./DOSE EVERY 4 HOURS FOR A TOTAL OF 120 GAL./DAY. INSTALLER TO VERIFY DOSE AMOUNT BY PERFORMING DRAIN DOWN AND RUN TIME TEST RESULTS SHALL BE PROVIDED TO THE DESIGNER FOR INCLUSION WITH THE AS-BUILT.

CUSTOMER: DAVID A. SMITH (253) 307-1032
4807 51ST ST. E.
TAMPA, FL 33645

SITE ADDRESS: 401 1/2 45th Ave. S. DATE: 1-7-19
PARCEL NO.: 04-19-01-5-001 REV. DATE: —

PENINSULA SEPTIC DESIGNS
SANDRA R. SMITH
P.O. BOX 1444, GIG HARBOR WA 98335 PH#(253) 851-2178

ON SITE SEPTIC DESIGN JOB NO. 0021-1

9/19/82 802 #9-557

[illegible]